"Tracking Technology"

Grand Computers Club
New Technologies SIG
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Topics

- **Overview**
- **Real-world examples**
- **Tracking threats**
- **Tracking encounters**
- **Open discussion**
- **Questions**

Overview

Definition:

"Location Intelligence is defined as the capacity to organize and understand complex data through the use of geographic relationships. LI organizes business and geographically referenced data to reveal the relationship of location to people, events, transactions, facilities, and assets."

Wikipedia.com

Overview

- "…I'm not really worried. After all I'm not a criminal, and I'm not doing anything bad. I don't care if somebody looks at what I'm doing online"

- "privacy is recognized as a fundamental human right" 1948 United Nations Universal Declaration of Human Rights

www.haveibeenpwned.com

Overview

Examples of tracking devices and technology

- **Radio Frequency Identification (RFID) - passive**
- **Radio tracking – active**
- **GPS/Satellite tracking**
- **Cellular triangulation**
- **Bluetooth beacon**
- **Financial transactions**
- **Photo/video recognition**
- **Facial recognition vs. facial authentication**
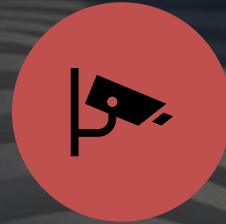
Real-World Examples

Everyone has a reason to care about their data accumulation. What's yours?

- **I find ads that follow me around on the internet creepy.**

- **I'm worried someone will steal my identity and open accounts in my name.**

- **I don't think companies should be making money off my personal information.**

- **I'm worried my data will affect my credit rating or lead to higher insurance costs.**

Real-World Examples

- I don't like the thought of all my online searches being recorded (especially the really personal ones!).

- I don't like not knowing what information about me is recorded.

- I'm embarrassed about those old photos online.

- I wish I felt more in control of my digital life.

- Of course I have something to hide – no-one's really that boring (or perfect!).

Tracking Threats to Privacy

IT PUTS US ON A PATH TOWARDS AUTOMATED BLANKET SURVEILLANCE

IT OPERATES WITHOUT A CLEAR LEGAL OR REGULATORY FRAMEWORK

IT VIOLATES THE PRINCIPLES OF NECESSITY AND PROPORTIONALITY

IT VIOLATES OUR RIGHT TO PRIVACY

IT HAS A CHILLING EFFECT ON OUR DEMOCRATIC POLITICAL CULTURE

Tracking Threats to Privacy

IT DENIES CITIZENS THE OPPORTUNITY FOR CONSENT

IT IS OFTEN INACCURATE

IT CAN LEAD TO AUTOMATION BIAS

IT IMPLIES THERE ARE SECRET GOVERNMENT WATCHLISTS

IT CAN BE USED TO TARGET ALREADY VULNERABLE GROUPS

Tracking
Encounters

Encounters with Personal Privacy

- **Universal Product Code UPC – demographics**
- **Financial transactions– follow the money**
- **Cell phone tracking – where have you been?**
- **Personal cell phone & apps – spyware and malware**
- **Facial recognition – running won't hide you**
- **Citizen scoring – we know if you've been bad**
- **Predictive monitoring – caught you before you did it**

Tracking Encounters

Near future threats to Personal Security

- **Real-time fake news – but I'm watching it live**
- **False alarms and alerts – Civil alerts; traffic control**
- **Zombie devices – falsified messages, signatures**
- **Identity swapping – not the droids we are looking for**
- **Record tampering – release of info; changed info**
- **IoT device flaws – entry into home via network**
- **Process manipulation – altering of food & goods**

Useful Sites

- **John Oliver Explains Why Facial Recognition Technology Is More Dangerous Than Ever**
- **Impinj Promotes Rain RFID Tracking Technology**
- **Clearview AI to stop selling controversial facial recognition app to private companies**
- **The Secretive Company That Might End Privacy as We Know It**
- **Facial recognition: ten reasons you should be worried about the technology**

Useful Sites

- **How China Tracks Everyone | VICE on HBO**
- **An Introduction to China's Social Corporate Credit System**
- **Clearview AI is also being used to identify child victims of sexual abuse**
- **The technologies the world is using to track coronavirus — and people**
- **iPhone feature will record police interaction, send location**

Useful Sites

- [Contact tracing apps: 4 potential privacy issues you should know about](#)

- [Tech companies push for nationwide facial recognition law. Now comes the hard part](#)

- [Microsoft says company will not sell facial recognition tech to police](#)

- [Why face-recognition technology has a bias problem](#)

Next Meeting

"To Be Determined"
Thursday July 15. 2020
3:30-5:00pm
Virtual Meeting
Invitation will be Sent

Questions???

Discussion

www.grandcomputers.org